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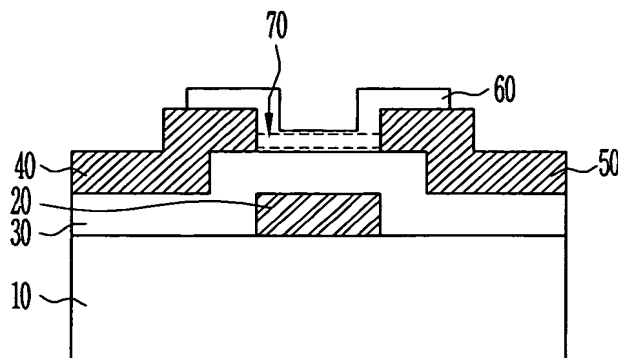
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(54) Title: METAL-INSULATOR TRANSITION SWITCHING TRANSISTOR AND METHOD FOR MANUFACTURING THE SAME



(57) Abstract: Provided is a metal-insulator-transition switching transistor with a gate electrode on a silicon substrate (back-gate structure) and a metal-insulator-transition channel layer of VO₂ that changes from an insulator phase to a metal phase, or vice versa, depending on a variation of an electric field, and a method for manufacturing the same, whereby it is possible to fabricate a metal-insulator-transition switching transistor having high current gain characteristics and being stable thermally.

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